

What is claimed is:

[1] An insulin resistance-improving agent comprising a pharmaceutically acceptable anion exchange resin as an active ingredient.

[2] The insulin resistance-improving agent according to claim 1, wherein the pharmaceutically acceptable anion exchange resin has a bile acid-adsorbing ability.

[3] The insulin resistance-improving agent according to claim 1 or 2, wherein the pharmaceutically acceptable anion exchange resin is selected from the group consisting of colestimide, cholestyramine resin, colestipol, sevelamer hydrochloride, and colesevelam hydrochloride.

[4] The insulin resistance-improving agent according to claim 1 or 2, wherein the pharmaceutically acceptable anion exchange resin is an anion exchange resin synthesized by a polymerization reaction of an epichlorohydrin derivative and an amine of which typical example includes an imidazole derivative.

[5] The insulin resistance-improving agent according to any one of claims 1 to 4, wherein the pharmaceutically acceptable anion exchange resin is colestimide.

[6] The insulin resistance-improving agent according to any one of claims 1 to 5, with which an oral hypoglycemic agent is used simultaneously, separately, or successively.

[7] The insulin resistance-improving agent according to claim 6, wherein the oral hypoglycemic agent is selected from the group consisting of α -glucosidase inhibitors, biguanides, insulin sensitivity improving agents, sulfonylurea agents, rapid-acting insulin secretagogues, pharmaceutical preparations comprising GLP-1 or derivatives thereof, and DPP-IV inhibitors.

[8] An onset-suppressing and/or therapeutic agent for insulin resistance syndrome comprising a pharmaceutically acceptable anion exchange resin as an active ingredient.

[9] The onset-suppressing and/or therapeutic agent according to claim 8, wherein the pharmaceutically acceptable anion exchange resin has a bile acid-adsorbing ability.

[10] The onset-suppressing and/or therapeutic agent according to claim 8 or 9, wherein the pharmaceutically acceptable anion exchange resin is selected from the group consisting of colestimide, cholestyramine resin, colestipol, sevelamer hydrochloride, and colesevelam hydrochloride.

[11] The onset-suppressing and/or therapeutic agent according to claim 8 or 9, wherein

the pharmaceutically acceptable anion exchange resin is an anion exchange resin synthesized by a polymerization reaction of an epichlorohydrin derivative and an amine of which typical example includes an imidazole derivative.

[12] The onset-suppressing and/or therapeutic agent according to any one of claims 8 to 11, wherein the pharmaceutically acceptable anion exchange resin is colestimide.

[13] The onset-suppressing and/or therapeutic agent according to any one of claims 8 to 12, with which an oral hypoglycemic agent is used simultaneously, separately, or successively.

[14] The onset-suppressing and/or therapeutic agent according to claim 13, wherein the oral hypoglycemic agent is selected from the group consisting of α -glucosidase inhibitors, biguanides, insulin sensitivity improving agents, sulfonylurea agents, rapid-acting insulin secretagogues, pharmaceutical preparations comprising GLP-1 or derivatives thereof, and DPP-IV inhibitors.

[15] A prophylactic, improving and/or therapeutic agent for a disease or symptom resulting from insulin resistance, which comprises a pharmaceutically acceptable anion exchange resin as an active ingredient.

[16] The prophylactic, improving and/or therapeutic agent according to claim 15, wherein the disease or symptom resulting from insulin resistance is selected from the group consisting of hyperinsulinism, abnormal lipid metabolism, arteriosclerosis, abnormal vascular endothelial function, coronary artery disease, cardiovascular disease, renal dysfunction, hypertension, fatty liver, type 2 diabetes, hyperuricemia, multiple risk factor syndrome, and gestational diabetes.

[17] The prophylactic, improving and/or therapeutic agent according to claim 15, wherein the disease or symptom resulting from insulin resistance is selected from the group consisting of hyperinsulinism, abnormal lipid metabolism, abnormal vascular endothelial function, coronary artery disease, cardiovascular disease, renal dysfunction, hypertension, fatty liver, type 2 diabetes, and hyperuricemia.

[18] The prophylactic, improving and/or therapeutic agent according to claim 15, wherein the disease or symptom resulting from insulin resistance is selected from the group consisting of hyperinsulinism, abnormal lipid metabolism, renal dysfunction, fatty liver, type 2 diabetes, and hyperuricemia.

[19] The prophylactic, improving and/or therapeutic agent according to claim 16 or 17, wherein the coronary artery disease or cardiovascular disease is myocardial infarction,

cerebral infarction, or cerebral apoplexy.

[20] The prophylactic, improving and/or therapeutic agent according to claim 16, wherein the multiple risk factor syndrome is syndrome X, visceral fat syndrome, or metabolic syndrome.

[21] The prophylactic, improving and/or therapeutic agent according to any one of claims 15 to 20, wherein the pharmaceutically acceptable anion exchange resin has a bile acid adsorbing ability.

[22] The prophylactic, improving and/or therapeutic agent according to any one of claims 15 to 21, wherein the pharmaceutically acceptable anion exchange resin is selected from the group consisting of colestimide, cholestyramine resin, colestipol, sevelamer hydrochloride, and colesevelam hydrochloride.

[23] The prophylactic, improving and/or therapeutic agent according to any one of claims 15 to 21, wherein the pharmaceutically acceptable anion exchange resin is an anion exchange resin synthesized by a polymerization reaction of an epichlorohydrin derivative and an amine of which typical example includes an imidazole derivative.

[24] The prophylactic, improving and/or therapeutic agent according to any one of claims 15 to 23, wherein the pharmaceutically acceptable anion exchange resin is colestimide.

[25] The prophylactic, improving and/or therapeutic agent according to any one of claims 15 to 24, with which an oral hypoglycemic agent is used simultaneously, separately, or successively.

[26] The prophylactic, improving and/or therapeutic agent according to claim 25, wherein the oral hypoglycemic agent is selected from the group consisting of α -glucosidase inhibitors, biguanides, insulin sensitivity improving agents, sulfonylurea agents, rapid-acting insulin secretagogues, pharmaceutical preparations comprising GLP-1 or derivatives thereof, and DPP-IV inhibitors.